

## PATENT ABSTRACTS OF JAPAN

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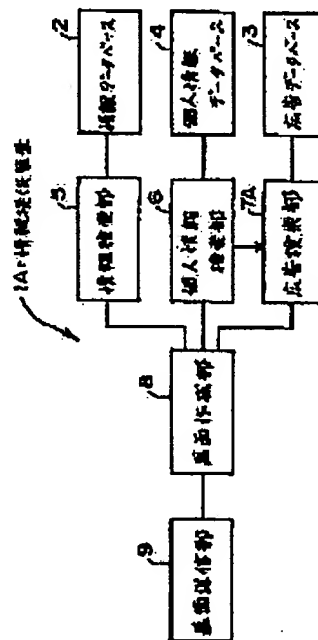
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## (54) INFORMATION PROVIDING DEVICE

## (57)Abstract:

**PROBLEM TO BE SOLVED:** To execute effective advertisement display and to efficiently obtain a large advertisement effect by providing optimum advertisement information to a service user in the case of displaying providing information and advertisement information at the time of executing information providing service on a network.

**SOLUTION:** The device is provided with an information data base 2, an advertisement data base 3 and a personal data base 4 for previously storing personal information. An information retrieving part 5 retrieves information corresponding to an information providing request from a terminal from the data base 2 as providing information. A personal information retrieving part 6 retrieves personal information for a user outputting the information providing request from the data base 4. An advertisement retrieving part 7A retrieves advertisement information corresponding to the personal information from the data base 3. A picture preparing part 8 prepares a display picture from these retrieved providing information and advertisement information. A picture transmitting part 9 transmits the display picture to the terminal.



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**CLAIMS**

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**[Claim(s)]**

[Claim 1]An information database which stores information with which a terminal should be provided, and an advertisement database which stores advertisement information, A personal information database which stores beforehand personal information about a user who performs an information service request from a terminal, An information retrieval section which retrieves information corresponding to an information service request from a terminal as provided information from this information database, A personal information retrieval part which searches personal information about a user who performed this information service request from this personal information database, An advertisement retrieving part which searches advertisement information according to personal information searched by this personal information retrieval part from this advertisement database, An information providing device offering a screen preparing part which creates a display screen which should be displayed at this terminal from provided information searched by this information retrieval section and advertisement information searched by this advertisement retrieving part, and a screen transmission section which transmits a display screen created by this screen preparing part to this terminal.

[Claim 2]An information database which stores information with which a terminal should be provided, and an advertisement database which stores advertisement information, An information retrieval section which retrieves information corresponding to an information service request from a terminal as provided information from this information database, An advertisement retrieving part which searches advertisement information relevant to information which had an information service request from this terminal from this advertisement database, An information providing device offering a screen preparing part which creates a display screen which should be displayed at this terminal from provided information searched by this information retrieval section and advertisement information searched by this advertisement retrieving part, and a screen transmission section which transmits a display screen created by this screen preparing part to this terminal.

[Claim 3]An information database which stores information with which a terminal should be provided, and an advertisement database which stores advertisement information, A personal information database which stores beforehand personal information about a user who performs an information service request from a terminal, An information retrieval section which retrieves information corresponding to an information service request from a terminal as provided information from this information database, A personal information retrieval part which searches personal information about a user who performed this information service request from this personal information database, An advertisement retrieving part which searches advertisement information according to information which had an information service request from this terminal, and personal information searched by this personal information retrieval part from this advertisement database, An information providing device offering a screen preparing part which creates a display screen which should be displayed at this terminal from provided information searched by this information retrieval section and advertisement information searched by this advertisement retrieving part, and a screen transmission section which transmits a display screen created by this screen preparing part to this terminal.

[Claim 4]Importance of advertisement information in this advertisement database, Or a degree of association of advertisement information in this advertisement database and provided information in this information database is defined, Add this importance or this degree of association to each advertisement information, and it stores in this advertisement database beforehand, The information providing device according to any one of claims 1 to 3 when two or more advertisement information is searched by this advertisement retrieving part, wherein this screen preparing part adjusts a displaying condition on said display screen of each advertisement information according to this importance or this degree of association added to each advertisement information.

[Claim 5]Two or more provided information searched by this information retrieval section from this information database according to an information service request from this terminal exists, And when such provided information has the common characteristic, this screen preparing part about advertisement information relevant to this common characteristic. The information providing device according to claim 4 which judges it as what has a higher degree of association with the provided information concerned, and is characterized by creating said display screen so that it may display in emphasis on said display screen.

[Claim 6]This screen preparing part judges an intention of an offer-of-information claimant based on key information specified by an information service request from this terminal, and about advertisement information relevant to the intention. The information providing device according to claim 4 which judges it as what has a higher degree of association with provided information, and is characterized by creating said display screen so that it may display in emphasis on said display screen.

[Claim 7]Until this screen preparing part acquires provided information required in order to create said display screen by this screen preparing part, Memorize a flow of an information service request by this terminal, judge an intention of an offer-of-information claimant based on this flow, and about advertisement information relevant to the intention. The information providing device according to claim 4 which judges it as what has a higher degree of association with provided information, and is characterized by creating said display screen so that it may display in emphasis on said display screen.

[Claim 8]When advertisement information which relates to said intention based on this key information directly does not exist, The information providing device according to claim 6 which this screen preparing part judges advertisement information near said intention based on this key information and a thesaurus dictionary, and is characterized by creating said display screen so that the advertisement information concerned may be displayed in emphasis on said display screen.

[Claim 9]This screen preparing part based on a kind, said degree of association, or said importance of advertisement information searched by this advertisement retrieving part from this advertisement database, The information providing device according to any one of claims 4 to 8 determining a viewing area and a display order of the advertisement information concerned on said display screen, and creating said display screen.

[Claim 10]When fields for advertisement information which should be displayed to display many the advertisement information run short, The information providing device according to claim 9 creating said display screen so that it may display, while this screen preparing part switches this advertisement information in predetermined advertisement display regions with a time interval according to every [ suitable / several ] and said degree of association, or said importance.

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[Translation done.]

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## DETAILED DESCRIPTION

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[Detailed Description of the Invention]

[0001]( Table of contents)

the technical field to which an invention belongs -- Prior art (drawing 12)

the issue which an invention tends to solve -- The means for solving a technical problem (drawing 1 - drawing 3)

Embodiment of the invention (drawing 4 - drawing 11)

EFFECT OF THE INVENTION[0002]

[Field of the Invention]This invention relates to the information providing device which adds advertisement information to provided information, creates a display screen, and is especially returned to a user terminal about the information providing device which retrieves the information which a user desires according to the information service request from a user terminal, and is returned to a user terminal as provided information.

[0003]

[Description of the Prior Art]The spread of the Internet etc. performs the providing request of the variety of information which a user desires from a user terminal to an offer-of-information server (information providing device) via a network in recent years. In the user terminal, informational service which displays on a display the information (display screen) provided from the offer-of-information server is generally performed.

[0004]At this time, an offer-of-information server provides a user terminal with the information which adds advertisement information (it may only be hereafter called advertisement information), and a user desires, and is also performing displaying an advertisement and advertisement information simultaneously with provided information with a user terminal. When adding and displaying advertisement information on provided information conventionally, the advertisement decided to be the field decided in the display screen is arranged and displayed.

[0005]For example, when a user demands offer of the information about "the gourmet map of the Italian cuisine" of an offer-of-information server and the information has been returned with the three advertisements A, B, and C. As shown in drawing 12, while the information about "the gourmet map of the Italian cuisine" is displayed, in the Screen 100 top, advertising A-C is displayed on predetermined advertisement display regions (drawing 12 lower region of Screen 100).

[0006]When there are many data entries of the advertisement database which stores advertisement information by the offer-of-information server side, whenever it refers to each page of provided information, the display for Advertising Department is replaced, and the advertisement in an advertisement database is displayed in order.

[0007]

[Problem(s) to be Solved by the Invention]However, when displaying conventionally the advertisement information accumulated on the server with a user terminal, the advertising display is performed, without taking into consideration entirely an intention, taste, etc. of the user (service user) of the offer-of-information point only by displaying the advertisement decided beforehand as mentioned above one by one. That is, to what kind of user it faces performing an advertising display, the broadcasting advertisement to many and unspecified

persons is performed conventionally, and an advertisement is displayed. Or since it was not taken into consideration at all, whether an advertisement is displayed to the user who is perusing what kind of information had SUBJECT that sufficient propaganda effect was not acquired.

[0008]When displaying an advertisement, it is most desirable to display, while the user is asking for the advertisement for which a user asks also for an advertiser also for a user. By the most useful advertisement for a user, and the other advertisement, when the display which a certain differentiation accomplished is performed, on a terminal, for a user, it becomes possible to identify useful advertisement information, an efficient propaganda effect will be acquired, and big profits will be brought about for an advertiser.

[0009]When it was originated in view of such SUBJECT, this invention performs informational service on a network and it displays advertisement information with provided information, it enables offer of the advertisement information optimal for a service user, An effective advertising display is performed and a big propaganda effect aims at providing the information providing device obtained efficiently.

[0010]

[Means for Solving the Problem]The information providing device 1A which drawing 1 is a principle block diagram of this invention, and is shown in this drawing 1, The information database 2 which stores information with which a terminal should be provided, and the advertisement database 3 which stores advertisement information, The personal information database 4 which stores beforehand personal information about a user who performs an information service request from a terminal, The information retrieval section 5 which retrieves information corresponding to an information service request from a terminal as provided information from the information database 2, The personal information retrieval part 6 which searches personal information about a user who performed an information service request from the personal information database 4, The advertisement retrieving part 7A which searches advertisement information according to personal information searched by this personal information retrieval part 6 from the advertisement database 3, The screen preparing part 8 which creates a display screen which should be displayed at a terminal from provided information searched by the information retrieval section 5 and advertisement information searched by the advertisement retrieving part 7A, and the screen transmission section 9 which transmits a display screen created by this screen preparing part 8 to a terminal are offered (Claim 1).

[0011]If a user performs an information service request from a terminal by above-mentioned composition, personal information about the user will be searched by the personal information retrieval part 6 from the personal information data 4, and advertisement information according to the personal information will be searched by the advertisement retrieving part 7A from the advertisement database 3. And a display screen is created by the screen preparing part 8 from provided information searched by the information retrieval section 5 and advertisement information according to a user's personal information, and it is transmitted to a terminal by the screen transmission section 9. Thereby, in a terminal which performed an information service request, an advertising display according to taste of a user of the terminal is performed at the same time presenting of provided information is performed (Claim 1).

[0012]The information providing device 1B which also shows this drawing 2 drawing 2 with a principle block diagram of this invention, The information database 2 which stores information with which a terminal should be provided, and the advertisement database 3 which stores advertisement information, The information retrieval section 5 which retrieves information corresponding to an information service request from a terminal as provided information from the information database 2, The advertisement retrieving part 7B which searches advertisement information relevant to information which had an information service request from a terminal from the advertisement database 3, The screen preparing part 8 which creates a display screen which should be displayed at a terminal from provided information searched by the information retrieval section 5 and advertisement information searched by the advertisement retrieving part 7B, and the screen transmission section 9 which transmits a display screen created by this screen preparing part 8 to a terminal are offered (Claim 2).

[0013]Advertisement information relevant to information which had the information service

request by above-mentioned composition when a user performed an information service request from a terminal is searched by the advertisement retrieving part 7B from the advertisement database 3. And a display screen is created by the screen preparing part 8 from advertisement information relevant to provided information searched by the information retrieval section 5 and information with an information service request, and it is transmitted to a terminal by the screen transmission section 9. Thereby, in a terminal which performed an information service request, an advertising display according to an intention of a user for this information service request (service user) is performed at the same time presenting of provided information is performed (Claim 2).

[0014]The information providing device 1C which also shows this drawing 3 drawing 3 with a principle block diagram of this invention, The information database 2 which stores information with which a terminal should be provided, and the advertisement database 3 which stores advertisement information, The personal information database 4 which stores beforehand personal information about a user who performs an information service request from a terminal, The information retrieval section 5 which retrieves information corresponding to an information service request from a terminal as provided information from the information database 2, The personal information retrieval part 6 which searches personal information about a user who performed an information service request from the personal information database 4, The advertisement retrieving part 7C which searches advertisement information according to information which had an information service request from a terminal, and personal information searched by the personal information retrieval part 6 from the advertisement database 3, The screen preparing part 8 which creates a display screen which should be displayed at a terminal from provided information searched by the information retrieval section 5 and advertisement information searched by the advertisement retrieving part 7C, and the screen transmission section 9 which transmits a display screen created by this screen preparing part 8 to a terminal are offered (Claim 3).

[0015]When a user performs an information service request from a terminal, by above-mentioned composition personal information (a jam is taste and an intention of a user) about the user, It is searched by the personal information retrieval part 6 from the personal information data 4, and advertisement information according to the personal information and information with an information service request is searched by the advertisement retrieving part 7C from the advertisement database 3. And a display screen is created by the screen preparing part 8 from advertisement information according to provided information searched by the information retrieval section 5 and information with a user's personal information and an information service request, and it is transmitted to a terminal by the screen transmission section 9. Thereby, in a terminal which performed an information service request, an advertising display not only according to taste of a user of the terminal but a user intention for this information service request is performed at the same time presenting of provided information is performed (Claim 3).

[0016]Importance of advertisement information in the advertisement database 3, Or a degree of association of advertisement information in the advertisement database 3 and provided information in the information database 2 is defined, Add the importance or degree of association to each advertisement information, and it stores in the advertisement database 3 beforehand, When two or more advertisement information is searched by the advertisement retrieving parts 7A-7C, the screen preparing part 8 may constitute according to importance or a degree of association added to each advertisement information so that a displaying condition on a display screen of each advertisement information may be adjusted (Claim 4).

[0017]At this time, two or more provided information searched by the information retrieval section 5 from the information database 2 according to an information service request from a terminal exists, And when such provided information has the common-characteristic, about advertisement information relevant to the common characteristic, the screen preparing part 8 judges it as what has a higher degree of association with the provided information concerned, and it creates a display screen so that it may display in emphasis on a display screen (Claim 5).

[0018]The screen preparing part 8 judges an intention of an offer-of-information claimant based

on key information specified by an information service request from a terminal, and it judges it as what has a higher degree of association with provided information about advertisement information relevant to the intention, and it creates a display screen so that it may display in emphasis on a display screen (Claim 6). Until it acquires provided information required in order that the screen preparing part 8 may create a display screen by the screen preparing part 8, A flow of an information service request by a terminal is memorized, an intention of an offer-of-information claimant is judged based on the flow, and about advertisement information relevant to the intention, it is judged as what has a higher degree of association with provided information, and a display screen is created so that it may display in emphasis on a display screen (Claim 7).

[0019]When advertisement information which relates to an intention based on said key information directly does not exist, the screen preparing part 8, Based on the key information and thesaurus dictionary, advertisement information near an intention of an offer-of-information claimant is judged, and a display screen is created so that the advertisement information may be displayed in emphasis on a display screen (Claim 8). And based on a kind, a degree of association, or importance of advertisement information searched by the advertisement retrieving parts 7A-7C from the advertisement database 3, the screen preparing part 8 determines a viewing area and a display order of the advertisement information on a display screen, and creates a display screen (Claim 9).

[0020]As mentioned above, in a terminal which performed an information service request by creating a display screen which performed displays (highlighting etc.) according to a kind, importance, or a degree of association of advertisement information by the screen preparing part 8. A user (service user) can identify useful advertisement information easily especially for self (Claims 4-9). When fields for advertisement information which should be displayed to display many the advertisement information run short, the screen preparing part 8 creates a display screen so that it may display switching advertisement information in predetermined advertisement display regions with a time interval according to every [ suitable / several ] and a degree of association, or importance (Claim 10).

[0021]By this, even if it is when there is much advertisement information which should be displayed, at a terminal which performed an information service request. Since an advertising display is performed switching the contents of advertisement information with a time interval according to a degree of association or importance, the user (service user) can identify useful advertisement information easily especially for self (Claim 10).

[0022]

[Embodiment of the Invention]Hereafter, an embodiment of the invention is described with reference to Drawings. The block diagram in which drawing 4 shows the composition of the information providing device (offer-of-information server) as one embodiment of this invention, and drawing 5 are the block diagrams showing the composition of the system to which this embodiment is applied.

[0023]First, the composition of the system to which the offer-of-information server (information providing device) 10 of this embodiment is applied is explained, referring to drawing 5. As shown in this drawing 5, the offer-of-information server 10 of this embodiment is connected to the terminal 30 via the network 20. A user (offer-of-information service user) connects the terminal 30 to the offer-of-information server 10 via the network 20, and demands offer of varieties of information, such as news, from the network 20 passage offer-of-information server 10 from this terminal 30.

[0024]The information database 12, the advertisement database 13, and the user profile data base 14 which are explained in full detail later are offered on the offer-of-information server 10 side. And if the offer-of-information server 10 is received [ an information service request ] from the terminal 30, while reading the information corresponding to the information service request from an information database as provided information, The advertisement information according to information with a user profile (personal information) or an information service request is read from the advertisement database 13 so that it may mention later, and the display screen which added advertisement information to provided information is created, it transmits to the terminal 30, and the display screen is displayed at the terminal 30.

[0025]The more detailed composition of such an offer-of-information server 10 is explained referring to drawing 4. As shown in this drawing 4, the offer-of-information server 10 of this embodiment, The provided information preparing part 18, the information database 12, The advertisement database 13, the user profile data base 14, the information retrieval section 15, the user profile retrieval part 16, the advertisement retrieving part 17, the user interface preparing part 19, the user interface template data base 19a. And it comprises the network interface part 11.

[0026]While the network interface part 11 receives the information service request from the terminal 30 via the network 20, The function as a screen transmission section which sends out the display screen created by the user interface preparing part 19 so that it might mention later to the network 20, and transmits to the terminal 30 is achieved. The information database 12 stores the varieties of information (news etc.) with which the terminal 30 should be provided, and the advertisement database 13, Store various advertisement information and the user profile data base (personal information database) 14, The user profiles (a field, age, sex, etc. with personal information; for example, a user's hobby, and interest) about the user (service user) who performs an information service request from the terminal 30 are stored beforehand.

[0027]The importance of each advertisement information and the degree of association of the advertisement information in the advertisement database 13 and the provided information in the information database 12 are beforehand defined by this embodiment, When the importance and degree of association are added to each advertisement information, are beforehand stored in the advertisement database 13 and read advertisement information, the importance and degree of association are also read simultaneously.

[0028]On the other hand, the information retrieval section 15 is what retrieves the information corresponding to the information service request from the terminal 30 as provided information from the information database 12, The user profile retrieval part (personal information retrieval part) 16, Search the user profile about the user who performed the information service request from the user profile data base 14, and the advertisement retrieving part 17, The advertisement information according to the information which had the information service request from the terminal 30, and the user profile searched by the user profile retrieval part 16 is searched from the advertisement database 13.

[0029]And the provided information preparing part 18 is what functions as a screen preparing part with the user interface preparing part 19 mentioned later, If the information service request from the terminal 30 is received by the network interface part 11, While extracting an information acquisition key (a keyword, line menu information, operation sequence) and directing search of the information corresponding to the information service request to the information retrieval section 15, search of the profile of the user who performed the information service request is directed to the user profile retrieval part 16.

[0030]The user profile with which the provided information preparing part 18 was searched by \*\* user profile retrieval part 16, \*\* Information (keyword) with an information service request, and \*\* operation sequence (until it acquires provided information required in order to create a display screen) The advertisement information which pointed to search of the advertisement information according to the flow of the information service request by the terminal 30 to the advertisement retrieving part 17, and was searched by this advertisement retrieving part 17, The function to carry out packaging of the provided information (display information) searched by the information retrieval section 15, and to transmit it to the user interface preparing part 19 mentioned later is achieved.

[0031]The user interface preparing part (screen preparing part) 19, It is what creates the display screen which should be displayed at the terminal 30 from the advertisement information and provided information (display information) which have been transmitted from the provided information creation 18, While embedding provided information (display information) at a screen template, a display screen is created by embedding advertisement information at a screen template according to a degree of association (importance). The screen template (a user interface template, a page template) is beforehand stored in the user interface template data base 19a.



[0032]Based on the kind, the degree of association, or importance of advertisement information, this user interface preparing part 19, Have a function (refer to drawing 8 and drawing 10) which determines automatically the viewing area and display order of advertisement information on a display screen, and creates a display screen, and also. When fields for the advertisement information which should be displayed to display many the advertisement information run short, it also has the function (refer to drawing 11) which creates a display screen so that it may display switching advertisement information in predetermined advertisement display regions with the time interval according to every [ suitable / several ] and degree of association, or importance. The user interface preparing part 19 creates a display screen so that advertisement information with high degree of association and importance may be expressed in emphasis in a position, a size, etc. which are more conspicuous.

[0033]Two or more provided information searched by the information retrieval section 5 from the information database 2 according to the information service request from the terminal 30 exists, And when such provided information has the common characteristics (a genre, a theme, etc.), the provided information preparing part 18, About the advertisement information relevant to the common characteristic, it is judged as what has a higher degree of association with provided information, and notifies to the user interface preparing part 19, and according to the degree of association, the user interface preparing part 19 creates a display screen so that the information that a degree of association is high may be displayed in emphasis on a display screen.

[0034]The provided information preparing part 18 judges a service user's (offer-of-information claimant) intention based on the keyword (key information) specified by the information service request from the terminal 30, About the advertisement information relevant to the intention, a degree of association with provided information judges it as a higher thing, notifies to the user interface preparing part 19, and the user interface preparing part 19, According to the degree of association, a display screen is created so that the information that a degree of association is high may be displayed in emphasis on a display screen (refer to drawing 9).

[0035]When the advertisement information which relates to the intention based on a keyword etc. directly at this time does not exist, the provided information preparing part 18, Based on the keyword etc. and thesaurus dictionary, the advertisement information near the intention of an offer-of-information claimant is judged, and it notifies to the user interface preparing part 19, and the user interface preparing part 19 creates a display screen so that the advertisement information may be displayed in emphasis on a display screen.

[0036]Until it acquires provided information required in order that the offer-of-information preparing part 18 may create a display screen, Memorize the flow (operation sequence) of the information service request by the terminal 30, judge the intention of an offer-of-information claimant based on the flow, and about the advertisement information relevant to the intention. It is judged as what has a higher degree of association with provided information, and notifies to the user interface preparing part 19, and according to the degree of association, the user interface preparing part 19 creates a display screen so that the information that a degree of association is high may be displayed in emphasis on a display screen (refer to drawing 9).

[0037]It explains referring to the flow chart (Step S1 – S9) shown in drawing 6 for fundamental operation of the offer-of-information server 10 of this embodiment constituted like \*\*\*\*. If the information service request from the terminal 30 is received by the network interface part 11 (Step S1), in the provided information preparing part 18, information acquisition keys, such as a keyword for information retrieval, line menu information, and an operation sequence, will be extracted (Step S2).

[0038]The provided information preparing part 18 points to search of the profile of the user who performed the information service request to the user profile retrieval part 16, and searches and acquires profiles with a user's hobby and interest, such as a field, age, and sex, from the user profile data base 14. (Step S3). The provided information preparing part 18 points to search of the information by a keyword to the information retrieval section 15, and searches and acquires provided information (display information) from the information database 12 (step S4).

[0039]The provided information preparing part 18 points to search of the advertisement information according to the keyword for information retrieval, an operation sequence, and the

user profile acquired at Step S3 to the advertisement information retrieval part 17, and searches and acquires the advertisement information from the advertisement database 13 (Step S5). At this time, the importance of advertisement information and the degree of association of advertisement information and provided information are also acquired simultaneously.

[0040]Packaging of the varieties of information acquired by step S4 and S5, such as display information, advertisement information, and a degree of association, is carried out, and they are transmitted to the user interface preparing part 19 from the provided information preparing part 18. And in the user interface preparing part 19. First, a screen template is acquired from the user interface template data base 19a (Step S6). While embedding display information at the screen template (Step S7), (Step S8) and a display screen are created by embedding advertisement information at a screen template according to a degree of association or importance. At this time, the advertisement information with high degree of association and importance is expressed in a position, a size, etc. which are more conspicuous, and a display screen is created so that it may be displayed in emphasis on a display screen.

[0041]It is sent out from the network interface part 11 in the network 20, and is transmitted to the terminal 30 (step S9), and the display screen created as mentioned above is displayed on the display of the terminal 30. Next, the display screen created by the offer-of-information server 10 of this embodiment is explained more concretely, referring to drawing 7 - drawing 11.

[0042]As shown in drawing 7, using the contents of provided information, advertisement information is searched with this embodiment from the advertisement database 14, and is published and displayed on the display screen by it. That is, while the request from a user is "the information about the delicious store of the Italian cuisine" and desired information is acquired from the information database 12 in the example shown in drawing 7 according to the request, The advertisement information relevant to the contents "Italian cuisine" of provided information is acquired from the advertisement database 13, and the display screen which published the advertisement relevant to the "Italian cuisine" is created.

[0043]Also in the example shown in drawing 8, like the example shown in drawing 7, the request from a user is "the information about the delicious store of the Italian cuisine", and desired information is acquired from the information database 12 according to the request. The profile of the user who performed this request is also searched with the example shown in this drawing 8 from the user profile data base 14. The information "he likes paste" is acquired as a user's taste, the advertisement information relevant to this user's taste "paste dish" and the contents "Italian cuisine" of provided information is acquired, and the advertisement relevant to the "Italian cuisine" and a "paste dish" is displayed on the advertisement region of an information page.

[0044]According to the importance of advertisement information, or a degree of association with provided information, when two or more advertisements exist at this time, as shown in drawing 8, a display position and the size of a viewing area are changed and it displays in emphasis as what has a high degree of association and the degree of demand, so that it may mention later also by drawing 10. For example, in drawing 8, the advertisement of a "paste special Italian restaurant" relevant to all of the "Italian cuisine" and a "paste dish" is most greatly displayed in the left-hand side of an advertisement region. The advertisement of the "doria special Italian restaurant" and the "Italian pub" relevant to the "Italian cuisine" is displayed in the same size as the remaining advertisement regions.

[0045]On the other hand, in this embodiment, by holding information, including keyword etc., when a user requests information, and an operation sequence until it requests information, as shown in drawing 9, the advertisement information which suited by intention of the user who is performing the information service request can be provided now. As shown in the upper row side of drawing 9, while a user refers to the display screen of "a delicious store guide", When the "Italian cuisine", a "paste dish", and "Yokohama" are made into a keyword and an information service request is performed, While performing information retrieval by these keywords to the information database 12, an advertising display as advertising search by the same keyword performed to the advertisement database 13, for example, shown in the upper row side of drawing 9 is performed.

[0046]At this time, the advertisement hit to more things of these keywords is displayed in emphasis with higher importance (degree of association). That is, the advertisement of a "paste special Italian cuisine Yokohama store" relevant to both three keywords "Italian cuisine" a "paste dish" and "Yokohama" is most greatly displayed in the left-hand side of an advertisement region, The advertisement of the "Yokohama Motomachi Italian pub" relevant to two or less keywords and a "doria special Italian restaurant" is displayed in the same size as the remaining advertisement regions.

[0047]As shown in the lower-berth side of drawing 9, when the user has changed from "party planning information" to the display screen of "a delicious store guide", In adding a "party plan" to the "Italian cuisine", a "paste dish", and "Yokohama" further, and choosing an advertisement as a keyword for advertising search, it is considered that it is an advertisement relevant to a "party plan." Thereby, as shown, for example in the lower berth of drawing 9, the advertisement relevant to a "large store" and secondary meeting-oriented a "karaoke box" is searched, and it is displayed on the advertisement region.

[0048]The advertisement which hits to more things of these keywords also at this time is displayed in emphasis with higher importance (degree of association). That is, the advertisement of a "paste special Italian cuisine large store" relevant to three keywords "Italian cuisine", a "paste dish", and a "large store" is most greatly displayed in the left-hand side of an advertisement region, The advertisement of the "Yokohama Motomachi Italian pub" relevant to two keywords and "a karaoke box in front of Yokohama Station" is displayed in the same size as the remaining advertisement regions.

[0049]On the other hand, as mentioned above, when the advertisement information to which importance or a degree of association was added is searched from the advertisement database 13, In the user interface preparing part 19, the deep advertisement of relation can be displayed more intelligibly for a user by changing a viewing area and a display position according to the importance or degree of association, and creating a display screen. For example, the three advertisements A, B, and C to which the importance 80, 50, and 40 was added, respectively are searched with the example shown in drawing 10 from the advertisement database 13, and these advertisements A, B, and C are displayed on the advertisement region sequentially from left-hand side in the size according to the ratio of the importance 80, 50, and 40 by it.

[0050]When the fields for there being many advertisement information searched from the advertisement database 13, and displaying the advertisement information run short, As mentioned above, in the user interface preparing part 19, a display screen is created so that it may display switching advertisement information in predetermined advertisement display regions with the time interval according to every [ suitable / several ] and degree of association, or importance.

[0051]For example, although six advertising A-F to which the importance 80, 70, 50, 40, 30, and 10 was added, respectively is searched with the example shown in drawing 11 from the advertisement database 13, In this case, display the screen which has arranged the three advertisements A, B, and C with high importance sequentially from left-hand side to the advertisement region in the size according to each importance first for 30 seconds, and subsequently, After displaying the screen which has arranged the three advertisements B, C, and D sequentially from left-hand side to the advertisement region in the size according to each importance for 20 seconds, After displaying the screen which has arranged the four advertisements C, D, and E and F sequentially from left-hand side to the advertisement region in the size according to each importance for 10 seconds, it returns to the display screen of the advertisement A, B, and C again, and these display screens are cyclically displayed at the terminal 30.

[0052]Thus, according to the offer-of-information server 10 as one embodiment of this invention, at the terminal 30 which performed the information service request. At the same time presenting of provided information is performed only not only in the taste of the user of the terminal 30, The advertising display according to the user intention for this information service request is performed, and a user (service user), While being able to obtain advertisement information with the value as additional information reflecting both a user's own taste and the

intention of a user's own present, for an advertiser, a more effective advertising display can be performed to a user.

[0053] That is, a more effective narrow cast public service campaign becomes possible, and the user can acquire important information from the broadcasting advertising method for conventional many and unspecified persons effectively. Therefore, for a user, the optimal advertisement information can be provided, an effective advertising display can be performed, and a big propaganda effect can be acquired efficiently. And by creating the display screen which performed the displays (highlighting etc.) according to the kind, the importance, or the degree of association of advertisement information by the user interface preparing part 19, as shown in drawing 8 - drawing 11, In the terminal 30 which performed the information service request, for self, especially, the user can identify useful advertisement information easily and can acquire more important information effectively.

[0054] This invention is not limited to the embodiment mentioned above, in the range which does not deviate from this invention and its meaning, can change variously and can be carried out.

[0055]

[Effect of the Invention] As explained in full detail above, according to the information providing device (Claim 1) of this invention, at the terminal which performed the information service request. The advertising display according to the taste (personal information) of the user of the terminal is performed, and at the same time presenting of provided information is performed a user (service user). While being able to obtain advertisement information with the value reflecting a user's own taste as additional information, for an advertiser, a more effective advertising display can be performed to a user. Therefore, for a user, the optimal advertisement information can be provided, an effective advertising display can be performed, and a big propaganda effect can be acquired efficiently.

[0056] According to the information providing device (Claim 2) of this invention, at the terminal which performed the information service request. The advertising display according to an intention of the user for this information service request (service user) is performed, and at the same time presenting of provided information is performed a user. While being able to obtain advertisement information with the value reflecting the intention of a user's own present as additional information, for an advertiser, a more effective advertising display can be performed to a user. Therefore, for a user, the optimal advertisement information can be provided, an effective advertising display can be performed, and a big propaganda effect can be acquired efficiently.

[0057] According to the information providing device (Claim 3) of this invention, at the terminal which performed the information service request. At the same time presenting of provided information is performed only not only in the taste of the user of the terminal, The advertising display according to the user intention for this information service request is performed, and a user (service user). While being able to obtain advertisement information with the value as additional information reflecting both a user's own taste and the intention of a user's own present, for an advertiser, a more effective advertising display can be performed to a user. Therefore, for a user, the optimal advertisement information can be provided, an effective advertising display can be performed, and a big propaganda effect can be acquired efficiently.

[0058] By creating the display screen which performed the display according to the kind, the importance, or the degree of association of advertisement information, for self, especially, the user can identify useful advertisement information easily and can acquire more important information effectively at the terminal which performed the information service request (Claims 4-9). Even if it is when there is much advertisement information which should be displayed, in the terminal which performed the information service request. Since an advertising display is performed switching the contents of advertisement information with the time interval according to a degree of association or importance, for self, especially, the user can identify useful advertisement information easily and can acquire more important information effectively (Claim 10).

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[Translation done.]

**\* NOTICES \***

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1.This document has been translated by computer. So the translation may not reflect the original precisely.

2.\*\*\*\* shows the word which can not be translated.

3.In the drawings, any words are not translated.

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**DESCRIPTION OF DRAWINGS**

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**[Brief Description of the Drawings]**

[Drawing 1]It is a principle block diagram of this invention.

[Drawing 2]It is a principle block diagram of this invention.

[Drawing 3]It is a principle block diagram of this invention.

[Drawing 4]It is a block diagram showing the composition of the information providing device (offer-of-information server) as one embodiment of this invention.

[Drawing 5]It is a block diagram showing the composition of the system to which this embodiment is applied.

[Drawing 6]It is a flow chart for explaining operation of this embodiment.

[Drawing 7]While explaining operation of this embodiment, it is a figure showing the display example in a terminal.

[Drawing 8]While explaining operation of this embodiment, it is a figure showing the example of an advertising display in a terminal.

[Drawing 9]While explaining operation of this embodiment, it is a figure showing the example of an advertising display in a terminal.

[Drawing 10]While explaining operation of this embodiment, it is a figure showing the example of an advertising display in a terminal.

[Drawing 11]While explaining operation of this embodiment, it is a figure showing the example of an advertising display in a terminal.

[Drawing 12]It is a figure showing the example of the screen which displays provided information and advertisement information simultaneously.

**[Description of Notations]**

1A, 1B, and 1C Information providing device

2 Information database

3 Advertisement database

4 Personal information database

5 Information retrieval section

6 Personal information retrieval part

7A, 7B, and 7C Advertisement retrieving part

8 Screen preparing part

9 Screen transmission section

10 Offer-of-information server (information providing device)

11 Network interface part (screen transmission section)

12 Information database

13 Advertisement database

14 User profile data base (personal information database)

15 Information retrieval section

16 User profile retrieval part (personal information retrieval part)

17 Advertisement retrieving part

18 Provided information preparing part (screen preparing part)

19 User interface preparing part (screen preparing part)

19a User interface template data base

20 Network

30 Terminal

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[Translation done.]